Students will understand and be able to effectively apply physical, graphic and electronic communications techniques in processing, transmitting, receiving and organizing information.

K-12 PERFORMANCE STANDARDS

Educational experiences in **Grades K-4** will assure that students:

- define *technological system;*

- identify the parts of a technological system;

- use a technological system;

- describe the function of various systems;

- describe the universal input, process, output, feedback (IPOF) system model; and

- demonstrate an IPOF system.

Educational experiences in **Grades 5-8** will assure that students:

- identify and give examples of integrated technologies;

- identify the elements of interpersonal communication;

- identify the elements of mass communications;

- acquire technology-based information and apply it in classroom and laboratory situations;

- explore and explain the integration of communication technologies into transportation and production systems;

- apply techniques of interpersonal and mass communication through activities such as sketching, computer-aided drafting (CAD), photography and video; and

- evaluate and select appropriate methods of communication for a given problem or situation.

Educational experiences in **Grades 9-12** will assure that students:

- describe electronic publishing and give examples of this technology;

- demonstrate the proper use of the terminology associated with electronic publishing, graphic arts and computers;

- identify and describe component functions of a microcomputer electronic publishing system;

- apply accepted design principles of text and graphics to the layout of printed and electronically published materials;

- operate a scanner and digitize a video image using appropriate software;

- demonstrate skills in marketing printed products;

- send and access information through a network;

(continued)

K-12 PERFORMANCE STANDARDS, continued

Educational experiences in **Grades 9-12** will assure that students:

- design and produce a video and multimedia production;

- capture a signal from an orbiting satellite;

- transfer information using laser transmission technology;

- communicate using fiber optic cables;

- operate a computer-aided drafting (CAD) system;

- generate a computer image of an object in 3D format;

- render an object to include texture, density, lighting and rotational movement; and

- export and import images in a variety of file forms.